

Degrees of Heat

Freddie Zeigler

The summer season is a great time to exercise, relax, or even take a vacation. If your summer activities require you to be exposed to the sun rays for a long period of time, then it is important that you are aware of the possible danger involved and take the proper precautions to ensure your safety. If you have ever experienced a time when the temperature outside feels hotter than the actual temperature, you then have an understanding about the principles of the Heat Index. The Heat Index combines the various effects of heat and humidity. Warm temperatures feel even warmer when it is humid. The Heat Index gives an accurate measure of how hot it really feels when the relative humidity is added to the actual air temperature.

Prolonged exposure in extreme heat can cause fatigue, sunstroke, heat cramps, heatstroke, and even death. Heat kills by stressing the human body beyond its abilities. In a normal year, about 175 Americans die from the demands of the summer heat. Hot temperatures take more lives than lightning, hurricanes, tornadoes, floods, or earthquakes. In the 40 year period from 1936 through 1975, nearly 20,000 people were killed in the United States by the effects of heat and solar radiation. In the disastrous heat wave of 1980, more than 1,250 people died. Be cautious, don't let hot temperatures destroy your body and your summer fun. Avoid prolonged physical activities in the heat. If your body begins to feel weak, this could be a sign for you to take a break from the sun. Keep your cool by taking advantage of shaded areas and drinking plenty of water.

The color coded chart below depicts the heat indices and heat disorders.

Relative Humidity (%)

With Prolonged Exposure and/or Physical Activity

Extreme Danger
Heat stroke or sunstroke highly likely
Danger
Sunstroke, muscle cramps, and/or heat exhaustion likely
Extreme Caution
Sunstroke, muscle cramps, and/or heat exhaustion possible
Caution
Fatigue Possible

Air Temperature °F

	40	45	50	55	60	65	70	75	80	85	90	95	100
110	136												
108	130	137											
106	124	130	137										
104	119	124	131	137									
102	114	119	124	130	137								
100	109	114	118	124	129	136							
98	105	109	113	117	123	128	134						
96	101	104	108	112	116	121	126	132					
94	97	100	102	106	110	114	119	124	129	135			
92	94	96	99	101	105	108	112	116	121	126	131		
90	91	93	95	97	100	103	106	109	113	117	122	127	132
88	88	89	91	93	95	98	100	103	106	110	113	117	121
86	85	87	88	89	91	93	95	97	100	102	105	108	112
84	83	84	85	86	88	89	90	92	94	96	98	100	103
82	81	82	83	84	84	85	86	88	89	90	91	93	95
80	80	80	81	81	82	82	83	84	84	85	86	86	87

Heat Index
(Apparent Temperature)



Lightning A Deadly Force

Phil Grigsby

In the United States, there are an estimated 25 million lightning strikes a year. Over the past 30 years, these lightning strikes have killed an average of 62 people per year. So far in 2009, 4 people have been killed by lightning strikes. In 2008, 28 people died due to lightning strikes with hundreds of others being injured. With this in mind there are several ways you can keep yourself and your family safe when lightning occurs.

First, some things you may not know about lightning. All thunderstorms produce lightning and are dangerous. In an average year, lightning kills about the same number of people as tornadoes and more people than hurricanes. Also, lightning often strikes outside the heavy rain area, and may strike as far as 10 miles away from any rainfall. Remember, if you can hear thunder, you are in danger.

So, what should you do if lightning threatens your area? Before a storm hits, have a lightning safety plan in place. Know where you'll go for safety and how much time it will take to get there in the event lightning threatens. If thunderstorms are forecast, consider postponing outdoor activities to avoid being caught in a dangerous situation. If you do decide to go on with the activities, monitor the weather and look for signs of a developing thunderstorm such as darkening skies, flashes of lightning, or increasing wind. If a thunderstorm does threaten your area, get to a safe place. If you hear thunder, even a distant rumble, immediately move to a safe place. Fully enclosed buildings provide the best shelter. Sheds, picnic shelters, tents, or covered porches do not protect you from lightning. If a sturdy building is not nearby, get into a hard-topped vehicle and close all the windows. When inside a building during a lightning event, do not use a corded phone except for emergencies. Cordless and cell phones are safe to use. In addition, keep away from electrical equipment and wiring, and do not take a shower or bath during a storm. Lightning can travel through the electrical wiring and plumbing. Do not go outside until 30 minutes after you hear the last rumble of thunder.



If you cannot find shelter during a thunderstorm there are several things you should not do while outside. Try to avoid open areas. Lightning is often attracted the tallest object in the area. With this in mind, also try to stay away from isolated tall trees, utility poles, or towers. In addition, try to stay away from metal conductors such as wires or fences. Although metal does not attract lightning, the lightning can travel long distances through it. If you are in a group of people, spread out. This will help prevent multiple casualties if lightning does strike, and increase the chances that someone could quickly help if a person is struck.

In the event that someone is struck by lightning, and you are nearby there are several things you need to quickly do. First, remember that lightning victims do not carry an electrical charge, are safe to touch, and need urgent medical attention. Cardiac arrest is the most common cause of death. Some deaths can be prevented if the victim receives proper aid immediately. Remember to call for help by dialing 911 or your local ambulance service. If you are trained to do so, give CPR to the person immediately. Also, if possible, move the victim to a safer place. Lightning can strike twice.

Remember, lightning is dangerous. With common sense, you can greatly increase your safety and the safety of those you are with. At the first clap of thunder, go to a large building or fully enclosed vehicle and wait 30 minutes after the last clap of thunder before you go back outside.



Summer Climatology

Michael Shields

The summer months of June, July, and August are characterized by hot and humid conditions across southeast Louisiana and south Mississippi. Since cold fronts rarely make it this far south during the summer, relief from the heat mainly comes in the form of isolated to scattered showers and thunderstorms that typically occur during the afternoon hours on many summer days. On average, the summer months are some of the wettest of the year and it's not uncommon for some of the thunderstorms to produce locally heavy downpours of rain. In addition, June 1st marks the beginning of hurricane season in the Atlantic basin. Tropical systems have impacted the region during each of the summer months, but the threat increases late in the summer by the last half of August.

Temperatures are fairly uniform across the region during the summer with normal minimum temperatures generally ranging from the upper 60s to middle 70s and normal high temperatures in the upper 80s to lower 90s. The daily range of temperatures tends to be slightly less along the immediate coast when compared to more inland locations due to the moderating influence of the warm Gulf of Mexico waters. Monthly record low temperatures are mainly in the 50s while monthly record high temperatures are in the lower 100s. Rainfall can be highly variable from one location to the next during the summer due to the somewhat random nature of thunderstorm development during the heat of the day. However, in general, normal monthly rainfall amounts are in the 5 to 6 inch range each of the summer months.

The summer outlook issued by the Climate Prediction Center (www.cpc.noaa.gov) on May 21, 2009, indicates an enhanced chance for above normal temperatures during the period. There is an equal chance of above, below, or near normal rainfall for the season.

The Bayou Observer

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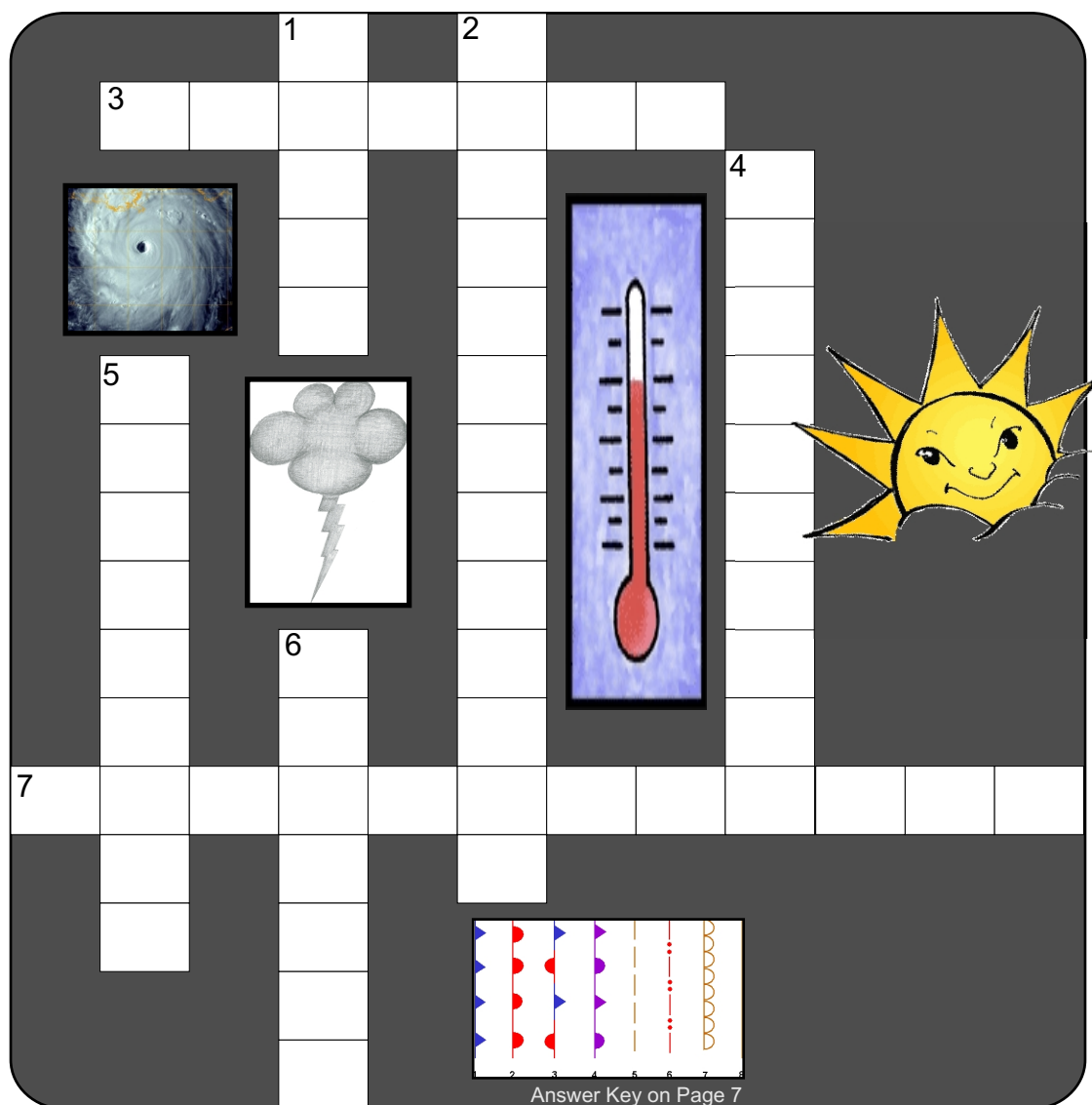
Normal Record	JUNE		Rainfall
	High	Low	
	86-91 F 100-103 F	68-73 F 46-55 F	5.00-6.25 in
Normal Record	JULY		Rainfall
	High	Low	
	88-92 F 101-103 F	70-75 F 56-60 F	5.50-7.00 in
Normal Record	AUGUST		Rainfall
	High	Low	
	88-92 F 102-106 F	69-74 F 56-60 F	5.00-6.25 in

Hurricane Crossword Word Bank

Storm surge
Eyewall
Warm core eddy
Saffir Simpson
Camille
Millibars
Betsy

Hurricane Crossword Puzzle

Michael Efferson



ACROSS

- 3 Area of a hurricane where strongest winds usually occur.
7 Pocket of warm water that can provide hurricanes additional strength.

DOWN

- 1 A 1965 hurricane which made landfall in Grand Isle, LA and caused a 10 foot rise in the Mississippi River at New Orleans.
2 Scale used to describe hurricane strength.
4 An abnormal rise in sea level accompanying a hurricane.
5 Unit of pressure measured by the Hurricane Hunter Aircraft
6 A category 5 hurricane which destroyed much of the Mississippi coast in 1969.

